Please amend the claims as follows:

1. (previously presented) A system for preventing damage to a capacitive membrane ultrasound transducer, the system comprising:

a flexible membrane adjacent a void;

a conductor connected with the flexible membrane; and

a voltage limiting circuit connected with the conductor.

2. (previously presented) The system of Claim 1 wherein the conductor comprises an electrode on the flexible membrane and a signal trace connected with the electrode.

3. (original) The system of Claim 1 wherein the voltage limiting circuit comprises at least one Zener diode connected between the conductor and a ground.

4. (original) The system of Claim 3 wherein the at least one Zener diode comprises two Zener diodes in series with opposite polarities.

5. (original) The system of Claim 1 wherein the voltage limiting circuit comprises:

a first voltage source; and

a first diode connected between the conductor and the first voltage source.

6. (original) The system of Claim 5 wherein the voltage limiting circuit further comprises:

a second voltage source with a negative voltage, the first voltage source having a positive voltage;

a second diode connected between the conductor and the second voltage source.

7. (previously presented) The system of Claim 1 further comprising:

first and second electrodes associated with the flexible membrane and void, respectively;

wherein the voltage limiting circuit comprises a switch operable to short the first electrode to the second electrode.

8. (original) The system of Claim 7 wherein the switch comprises a relay.

9. (original) The system of Claim 1 wherein at least one component of the voltage limiting circuit is within a transducer probe.

10. (original) The system of Claim 9 wherein the at least one component is integrated with a preamplifier.

11. (original) The system of Claim 1 wherein at least one component of the voltage limiting circuit is within a transducer connector of an imaging system.

12. (previously presented) A method for preventing damage to a capacitive membrane ultrasound transducer, the method comprising:

(a) generating one of acoustic and electrical signals with variation between a first electrode on a membrane and a second electrode, the variation is flexing of the membrane; and

(b) limiting a voltage between the first and second electrodes with a protection circuit.

13. (original) The method of Claim 12 wherein (b) comprises holding a voltage between the first and second electrodes substantially constant where the voltage may exceed a breakdown voltage of the membrane.

14. (original) The method of Claim 12 wherein (b) comprises draining current away from at least one of the first and second electrodes, wherein the drain in current limits a voltage difference between the first and second electrodes.

15. (original) The method of Claim 12 wherein (b) comprises limiting the voltage with at least one Zener diode connected between one of the first and second electrodes and a ground.

16. (original) The method of Claim 12 wherein (b) comprises limiting the voltage with a first voltage source and a first diode connected between one of the first and second electrodes and the first voltage source.

17. (original) The method of Claim 12 wherein (b) comprises shorting the first electrode to the second electrode at time other than during performance of (a).

18. (original) The method of Claim 12 wherein the protection circuit is within a transducer probe.

19. (original) The method of Claim 18 wherein (b) comprises limiting with the protection circuit integrated with a receive preamplifier.

20. (original) A system for preventing damage to a capacitive membrane ultrasound transducer, the system comprising:

the capacitive membrane ultrasound transducer; and

a high voltage protection circuit connected with the capacitive membrane ultrasound transducer.

21. (currently amended) The system of Claim ~~21~~ 20 wherein the high voltage protection circuit connects between the capacitive membrane ultrasound transducer and a preamplifier within a transducer probe.

devices for protecting input and output devices in integrated circuits, not flexible membranes or CMUTs.

Claim 8 was rejected pursuant to 35 U.S.C. § 103(a) as being unpatentable over Baumgartner, et al. in view of Shen, et al., Amano, Van Kraukauer, et al., and Robinson (U.S. Patent No. 5,940,259).

As mentioned above, there is no suggestion or motivation to combine the teachings of Baumgartner, et al., Shen, et al., Amano, and Van Kraukauer, et al. Claim 8 recites that a switch of the voltage limiting circuit comprises a relay. The Examiner cites Robinson that discloses AC and DC relays, arguing that the reference is pertinent because it involves overvoltage surge protection. However, Robinson does not involve protection against damage of flexible membranes or CMUTs, and, therefore, Robinson is not analogous art. Also, there is no motivation or suggestion to use the teachings of Robinson with the cited references. The Examiner is using impermissible hindsight.

Claim 17 was rejected pursuant to 35 U.S.C. § 103(a) as being unpatentable over Baumgartner, et al. in view of Shen, et al., Amano, and Kwong (U.S. Patent No. 6,118,640).

As mentioned above, there is no suggestion or motivation to combine the teachings of Baumgartner, et al., Shen, et al., and Amano. Furthermore, claim 17 recites a method comprising shorting the first electrode to the second electrode at a time other than during the performance of flexing the membrane. Kwong does not teach this limitation. Kwong discloses an ESD switch that is disabled when an integrated circuit chip is powered up and enabled when it is powered down. (Column 4, lines 10-15 and 23-35). However, there is no teaching of shorting electrodes, associated with a membrane, other than during the flexing of a membrane. Even the combination of the references does teach the claim limitation because combining the ESD switch that is enabled when an IC is powered down with a membrane of Baumgartner, et al. does not necessarily teach shorting of electrodes at a time other

than flexing of the membrane. For example, the IC could be powered down, but the membrane could still be flexing. Also, Kwong is not analogous and there is no motivation or suggestion to combine Kwong with the cited references because Kwong deals with ESD protection within mixed-signal integrated circuits, not protection of flexible membranes or CMUTs.